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| APPLICATION NO.  | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|--|-------------|----------------------|---------------------|------------------|
| 10/724,002   | 11/26/2003  | David Hoerl          | 644-036             | 7544             |
| 7590   | 09/28/2006  |                      | EXAMINER            |                  |
| Ward & Olivo<br>708 Third Avenue<br>New York, NY 10017 |             |                      | NGUYEN, THU HA T    |                  |
|  |             |                      | ART UNIT            | PAPER NUMBER     |
|  |             |                      | 2155                |                  |

DATE MAILED: 09/28/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

|                              |                              |                     |  |
|------------------------------|------------------------------|---------------------|--|
| <b>Office Action Summary</b> | <b>Application No.</b>       | <b>Applicant(s)</b> |  |
|                              | 10/724,002                   | HOERL, DAVID        |  |
|                              | Examiner<br>Thu Ha T. Nguyen | Art Unit<br>2155    |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 01 June 2004.
- 2a) This action is FINAL.                    2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 2-46 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 2-46 is/are rejected.
- 7) Claim(s) \_\_\_\_\_ is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All    b) Some \* c) None of:
  1. Certified copies of the priority documents have been received.
  2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | Paper No(s)/Mail Date. _____.                                     |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>attached herein</u> . | 5) <input type="checkbox"/> Notice of Informal Patent Application |
|  | 6) <input type="checkbox"/> Other: _____.                         |

**DETAILED ACTION**

1. Claims 2-46 are presented for examination.

**Claim Rejections - 35 USC § 102**

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. § 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

OR

e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

3. Claims 2-10, 22, and 25-33 are rejected under 35 U.S.C. § 102(e) as being anticipated by **Comstock et al.** (hereinafter Comstock) US. Pub. No. 2004/0083266.

4. As to claim 2, **Comstock** teaches the invention as claimed, including a system for improved video digitization and image correction, said system comprising:

a plurality of workstations coupled to a communications medium (figures 1-2);

a remote management unit coupled to said communications medium, said remote management unit including a video digitizer for converting analog video signals to digital video signals, said analog video signals received from at least one of a plurality of remote networking devices (figure 2, paragraphs 0030-0032, 0035-0034); and

an image correcting circuit for processing said digital video signals received from said digitizer (paragraphs 0035-0037, 0043-0046).

5. As to claim 3, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein each of said plurality of workstations is of a type comprising at least one keyboard, video monitor and cursor control device, and wherein each of said plurality of workstations is capable of accessing and operating said plurality of remote networking devices through said remote management unit (figures 1-2).

6. As to claim 4, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said remote management unit controls a power supply for each of said remote networking devices (paragraphs 0022-0024).

7. As to claim 5, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said communications medium is at least one selected from the group consisting of a LAN, a WAN, a wireless connection, a modem, a direct modem connection, and the Internet (paragraphs 0020-0021).

8. As to claim 6, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein each of said plurality of remote networking devices is connected to said remote management unit through cabling via a port selected from the group consisting of a serial port, parallel port, keyboard port, video port, cursor control device port, USB port, firewire port, bluetooth port, Ethernet port, and a power supply port (figures 1-2, paragraphs 0020-0021).

9. As to claim 7, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said remote management unit controls access by requiring identification data to authenticate a user (paragraph

0027).

10. As to claim 8, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said remote management unit and said plurality of user workstations communicate via TCP/IP (paragraphs 0020-0023).

11. As to claim 9, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said remote management unit and said plurality of user workstations communicate via the Internet (figures 1-2, paragraphs 0020-0021).

12. As to claim 10, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said video digitizer includes an analog to digital converter (paragraphs 0030-0032, 0035-0036).

13. As to claim 22, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said remote management unit includes a video processor circuit for compressing said digital video signals (paragraphs 0038, 0065).

14. As to claim 25, **Comstock** teaches the invention as claimed, including the system according to claim 22, wherein said video processor circuit

includes a video compression circuit (paragraphs 0038, 0065).

15. As to claim 26, **Comstock** teaches the invention as claimed, including the system according to claim 2, wherein said processing includes converting said digital video signals for compatibility with a video display of one of said plurality of workstations (figure 2, paragraphs 0030-0032, 0035-0034).

16. As to claim 27, **Comstock** teaches the invention as claimed, including a method for providing improved video digitization and image correction for the transmission of video signals, said method comprising the steps of:

(a) receiving analog video signals from one of a plurality of remote devices connected to a remote management unit (figures 1-2, paragraphs 0034-0037);

(b) converting said analog video signals to digital video signals (figure 2, paragraphs 0030-0032, 0035-0034);

(c) correcting said digital video signals (figure 2, paragraphs 0030-0032, 0035-0034, 0043); and

(d) transmitting said digital video signals to one of a plurality of user interface devices (figures 1-2, paragraphs 0039-0046).

17. As to claim 28, **Comstock** teaches the invention as claimed, including the method according to claim 27, wherein said user interface devices are accessible by inputting unique authentication information (paragraph 0027).

18. As to claim 29, **Comstock** teaches the invention as claimed, including the method according to claim 27, wherein said method further comprises the step of: displaying said digital video signals on a video display of one of said user interface devices (figure 2, paragraphs 0043-0046).

19. As to claim 30, **Comstock** teaches the invention as claimed, including the method according to claim 27, wherein said method further comprises the step of: compressing said digital video signals prior to said transmitting (paragraphs 0038, 0065).

20. As to claim 31, **Comstock** teaches the invention as claimed, including the method according to claim 30, wherein a compression algorithm is used to perform said compressing (paragraphs 0038, 0065).

21. As to claim 33, **Comstock** teaches the invention as claimed, including the method according to claim 27, wherein said transmitting occurs via TCP/IP (paragraphs 0020-0022).

### **Claim Rejections - 35 USC § 103**

22. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which

said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

23. Claims 11-21, 23-24, 32, and 34-46 are rejected under 35 U.S.C. § 103 (a) as being unpatentable over **Comstock et al.** (hereinafter Comstock) US. Pub. No. **2004/0083266**, in view of **Paz et al** (hereinafter Paz) U.S. Pub. No. **2004/0205213**.

24. As to claim 11, **Comstock** does not explicitly teach wherein said image correcting circuit includes an input interface circuit for detecting a color palette utilized by said remote network device.

However, **Paz** teaches wherein said image correcting circuit includes an input interface circuit for detecting a color palette utilized by said remote network device (paragraphs 0322, 0351, 0365, 0397).

It would have been obvious to one of ordinary skill in the Data Processing art at the time of the invention was made to combine the teachings of **Paz** into **Comstock** system because it would provide an efficient system to detect change and motion determination in image to provide an efficient compressing video system to allow the system for modifying the image for display (see Paz abstract, paragraphs 0013-0016).

25. As to claim 12, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit includes a synchronization selector circuit for receiving horizontal and vertical synchronization signals (paragraphs 0021, 0121, 0308-0319).

26. As to claim 13, **Paz** teaches the invention as claimed, including the system according to claim 12, wherein said image correcting circuit includes a mode detection circuit for receiving said synchronization signals from said synchronization selector circuit and for determining a frequency of said synchronization signals (paragraphs 0021, 0029, 0308, 310).

27. As to claim 14, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit includes an auto-adjustment circuit for performing at least one of active area detection, pixel brightness searching, pixel measurement and phase distortion measurement (paragraphs 0021, 0114, 0308-0310).

28. As to claim 15, **Paz** teaches the invention as claimed, including the system according to claim 14, wherein said auto-adjustment circuit updates timing of a clock during said phase distortion measurement (paragraphs 0383, 0399, 0404-0407).

29. As to claim 16, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit includes a downscaler circuit for reducing high video resolution to low video resolution (paragraphs 0114, 0310).

30. As to claim 17, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit includes an upscaler circuit for increasing low video resolution to high video resolution (paragraphs 0116, 0146, 0308).

31. As to claim 18, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit includes an option menu circuit for enabling a user to select one of a plurality of serial devices, remote servers, remote computers or power devices (paragraphs 0029, 0323).

32. As to claim 19, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit modifies each pixel of said digital video signals according to a color palette (see Paz abstract, paragraphs 0013-0016).

33. As to claim 20, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit includes a dithering circuit for approximating a color for a pixel of said digital video signals (abstract, paragraphs 0013-0016).

34. As to claim 21, **Paz** teaches the invention as claimed, including the system according to claim 2, wherein said image correcting circuit includes an

output interface circuit for adjusting timing of said analog video signals

(paragraphs 0383, 0399, 0404-0407).

35. As to claim 23, **Paz** teaches the invention as claimed, including the system according to claim 22, wherein said video processor circuit includes a pixel receiving circuit for receiving pixel information from said digital video signals (paragraphs 0052-0068).

36. As to claim 24, **Paz** teaches the invention as claimed, including the system according to claim 23, wherein said video processor circuit includes a frame buffer circuit for storing said pixel information (paragraphs 0184, 0295, 0357-0358).

37. As to claim 32, **Paz** teaches the invention as claimed, including the method according to claim 31, wherein said compression algorithm determines noise in said digital video signals, smoothes said digital video signals, determines changes to pixels of said digital video signals, and compresses said changed digital video signals (paragraphs 0029-0032).

38. As to claim 34, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting is performed by an image correction circuit (abstract, paragraphs 0029, 0308-0309).

39. As to claim 35, **Paz** teaches the invention as claimed, including the method according to claim 34, wherein said image correction circuit includes an interface circuit for detecting a color palette of said digital video signals (paragraphs 0322, 0351, 0365, 0397).

40. As to claim 36, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes receiving horizontal and vertical synchronization signals (paragraphs 0021, 0121, 0308-0319).

41. As to claim 37, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes determining one or more frequencies of said digital video signals (paragraphs 0021, 0029, 0308, 310).

42. As to claim 38, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes detecting an active area of a video image represented by said digital video signals (paragraphs 0021, 0114, 0308-0310).

43. As to claim 39, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes

determining brightness of each pixel of said digital video signals (paragraphs 0021, 0114, 0308-0310).

44. As to claim 40, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes measuring phase distortion of said digital video signals (paragraphs 0021, 0114, 0308-0310, 0368).

45. As to claim 41, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes measuring one or more pixels of said digital video signals (paragraphs 0029-0032).

46. As to claim 42, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes reducing high video resolution to low video resolution (paragraphs 0114, 0310).

47. As to claim 43, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes increasing low video resolution to high video resolution (paragraphs 0116, 0146, 0308).

48. As to claim 44, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes dithering said digital video signals (abstract, paragraphs 0013-0016).

49. As to claim 45, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said correcting further includes adjusting timing of said digital video signals (paragraphs 0383, 0399, 0404-0407).

50. As to claim 46, **Paz** teaches the invention as claimed, including the method according to claim 27, wherein said method further comprises the step of: storing pixel information of digital video signals (paragraphs 0184, 0295, 0357-0358).

### **Conclusion**

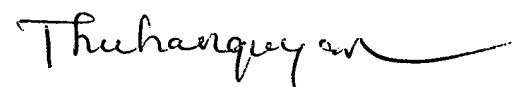
51. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure (see PTO-892).

52. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thu Ha Nguyen, whose telephone number is (571) 272-3989. The examiner can normally be reached Monday through Friday from 8:30 AM to 5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Najjar Saleh, can be reached at (571) 272-4006.

The fax phone numbers for the organization where this application or proceeding is assigned are (571) 273-8300 for regular communications.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



ThuHa Nguyen  
Patent Examiner

September 18, 2006